

# ***VIPER***®

Responder LC Model 5501

Remote Start Keyless Entry

Owner's Guide

***Directed***®  
E L E C T R O N I C S

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# Government regulations

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This device complies with Part 15 of FCC rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) This device must accept any interference received, including interference that may cause undesirable operation.

This equipment has been tested and found to comply with the limits for a class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television, which can be determined by turning the equipment Off and ON, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio / TV technician for help.

## Remote Controls

To satisfy FCC RF exposure compliance requirements, this device should be used in hand-held, hand operated configurations only. The device and its antenna must maintain a separation distance of 20 cm or more from the person's body, except for the hand and wrists, to satisfy RF exposure compliance. This device is designed to be used in a person's hands and its operating configurations do not support normal transmissions while it is carried in pockets or holsters next to a person's body.



## **Control Center**

To satisfy FCC RF exposure compliance requirements, the device and its antenna must maintain a separation distance of 20 cm or more from the person's body, except for the hand and wrists, to satisfy RF exposure compliance.

This device complies with the Industry Canada Radio Standards Specification RSS 210. Its use is authorized only on a no-interference, no-protection basis; in other words, this device must not be used if it is determined that it causes harmful interference to services authorized by IC. In addition, the user of this device must accept any radio interference that may be received, even if this interference could affect the operation of the device.

## **Warning:**

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this device.

## **Warning! Safety first**

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The following safety warnings must be observed at all times:

Due to the complexity of this system, installation of this product must only be performed by an authorized Directed dealer.

When properly installed, this system can start the vehicle via a command signal from the remote control transmitter. Therefore, never operate the system in an enclosed area or partially enclosed area without ventilation (such as a garage). When parking in an enclosed or partially enclosed area or when having the vehicle serviced, the remote start system must be disabled using the installed toggle switch. It is the user's sole responsibility to properly handle and keep out of reach from children all remote control transmitters to assure that the system does not unintentionally remote start the vehicle. THE USER MUST INSTALL A CARBON MONOXIDE DETECTOR IN OR ABOUT THE LIVING AREA ADJACENT TO THE VEHICLE. ALL DOORS LEADING FROM ADJACENT LIVING AREAS TO THE ENCLOSED OR PARTIALLY ENCLOSED VEHICLE STORAGE AREA MUST AT ALL TIMES REMAIN CLOSED. These precautions are the sole responsibility of the user.

Remote starters on manual transmission vehicles operate differently than those with automatic transmission because you must leave your car in neutral. You must read this Owner's Guide to familiarize yourself with the proper procedures regarding manual transmission remote starters. If you have any questions, ask your installer or contact Directed at 1-800-753-0600.

Before remote starting a manual transmission vehicle, be sure to:

- Leave the vehicle in neutral and be sure no one is standing in front or behind the vehicle.
- Only remote start on a flat surface
- Have the parking brake fully engaged

**WARNING!** It is the responsibility of the owner to ensure the parking/emergen-

cy brake properly functions. Failure to do so can result in personal injury or property damage. We recommend the owner have the parking / emergency brake system inspected and adjusted by a qualified automotive shop bi-annually.

Use of this product in a manner contrary to its intended mode of operation may result in property damage, personal injury, or death. (1) Never remotely start the vehicle with the vehicle in gear, and (2) Never remotely start the vehicle with the keys in the ignition. The user must also have the neutral safety feature of the vehicle periodically checked, wherein the vehicle must not remotely start while the car is in gear. This testing should be performed by an authorized Directed dealer in accordance with the Safety Check outlined in the product installation guide. If the vehicle starts in gear, cease remote start operation immediately and consult with the authorized Directed dealer to fix the problem.

After the remote start module has been installed, contact your authorized dealer to have him or her test the remote start module by performing the Safety Check outlined in the product installation guide. If the vehicle starts when performing the Neutral Safety Shutdown Circuit test, the remote start unit has not been properly installed. The remote start module must be removed or the installer must properly reinstall the remote start system so that the vehicle does not start in gear. All installations must be performed by an authorized Directed dealer.

OPERATION OF THE REMOTE START MODULE IF THE VEHICLE STARTS IN GEAR IS CONTRARY TO ITS INTENDED MODE OF OPERATION. OPERATING THE REMOTE START SYSTEM UNDER THESE CONDITIONS MAY RESULT IN PROPERTY DAMAGE OR PERSONAL INJURY. YOU MUST IMMEDIATELY CEASE THE USE OF THE UNIT AND SEEK THE ASSISTANCE OF AN AUTHORIZED Directed DEALER TO REPAIR OR DISCONNECT THE INSTALLED REMOTE START MODULE. DIRECTED WILL NOT BE HELD RESPONSIBLE OR PAY FOR INSTALLATION OR REINSTALLATION COSTS.

This product is designed for fuel injected vehicles only. Use of this product in a

standard transmission vehicle must be in strict accordance with this guide. This product should not be installed in any convertible vehicles, soft or hard top with a manual transmission. Installation in such vehicles may pose certain risk.

# What's included

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- One five-button/2-way Supercode Responder LC Remote Control
- One five-button/1-way Supercode companion remote
- The control module
- Control center with integrated status LED and Valet override switch
- A remote start defeat toggle switch
- Window decals
- Your warranty registration

## Important information

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Congratulations on the purchase of your state-of-the-art remote start system. Due to the complexity of this system, it must be installed by an authorized dealer only. Installation of this product by anyone other than an authorized dealer voids the warranty. All dealers are provided with a preprinted dealer certificate to verify authorization.

By carefully reading this Owner's Guide prior to using your system, you will maximize the use of this system and its features. You can print additional or replacement copies of this manual by accessing our web site at [www.directed.com](http://www.directed.com).

### ► Your warranty

Your warranty registration must be completely filled out and returned within 10 days of purchase. Your product warranty will not be validated if your warranty registration is not returned. Make sure you receive the warranty registration from your dealer. It is also necessary to keep your proof of purchase, which reflects that the product was installed by an authorized dealer.

### ► Replacement remote controls

Your system comes with one Responder LC remote control (P/N 7752V) and one companion remote control (P/N 7652V). If additional remotes are desired, please see your authorized dealer or visit [www.directedstore.com](http://www.directedstore.com) to order.

## ➤ Out of range notification

If a command is issued from the remote, but the remote is beyond the range of the vehicle to receive the command, the remote will respond with an out-of-range notification. If this occurs, the out-of-range icon displays on the LCD and the remote emits an error tones.

Since conditions will vary in different areas (ie: Weather, RF interference, etc) range may be affected and require you to be closer to the vehicle for successful transmission.

## ➤ System maintenance

The system requires no specific maintenance. The 2-way remote contains a non-replaceable rechargeable battery. When the battery begins to weaken, the operating range will be reduced.

Your 1-way remote is powered by small coin cell lightweight 3-volt lithium battery that will last approximately one year under normal use. The 1-way remote uses one CR2032 cell battery.

## ➤ Charging the Battery

- Plug in the USB charger (alternately a standard mini USB cable connected to any standard USB port on any laptop or desktop computer can also be used (cable not included)).
- The LCD displays "CHARGE" while the battery level bars within the battery icon flash.
- When charging is complete the LCD then displays "FULL".

**Note:** If the battery has been severely discharged all remote functions are disabled for a short charge period. The battery status outline flashes and CHARGE is displayed on the LCD. Once the battery has accumulated enough charge for functionality, the LCD icons initialize with a beep sound, the battery status outline stops flashing and the remote becomes operational while still displaying CHARGE.



**Warning!** The temperature range over which the battery can be charged is 0°C TO 45°C (32°F TO 113°F). Charging the battery at temperatures outside this range may cause severe damage to the battery or reduce battery life expectancy.

## ► Low battery indicator

When the batteries are low on the 2-way remote it will emit two groups of beeps, the battery icon flashes and low battery is indicated on the screen. The remote then emits an additional honk, (if this option is installed), when unlocking to let you know its time to change the battery. When the battery is low on the 1-way remote, the remote responds the same way audibly.

**Note:** The optional horn honks must be installed for the remote to emit additional honks during unlocking. Ask your authorized dealer if you have any questions.





## ► Battery Replacement

Slide the door up to expose the battery beneath the holder. Remove the expired battery. Place the new battery into the remote control. When power is returned the remote control is ready for use.

## ► Multi-car control capability

You can use the Responder LC 2-way remote control system for two cars, with full command capability for both vehicles.

### To change the car to be operated:

1. Press/hold the **f** button for 3 seconds or until the remote beeps. The car  or car  icon flashes. The LC text area displays the current vehicle selected.
2. Change Car: While in car selection mode, press and release the **f** button to scroll between car  and . The car icon flashes to indicate the car that can be operated.
3. Select the car number you want to operate, and then press any command button to operate the system. The selected car remains selected until the setting is changed.

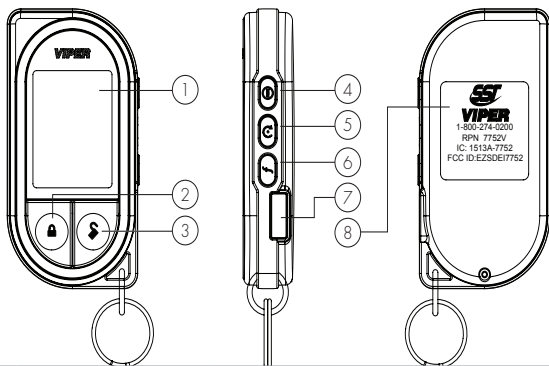
### One-way remote

1. Press and hold the **f** button until the amber light blinks once or twice indicating the current vehicle (one blink = car 1, two blinks = car 2).
2. To scroll from one to the other press the **f** button again.

When using the remote to control the system, the amber light will flash in a sequence of 1 or 2 flashes indicating the current vehicle mode.



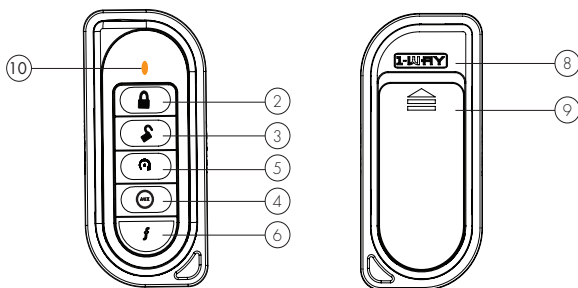
# Responder LC 2-way



| Feature | Description          |   |
|---------|----------------------|---|
| 1       | LCD (2-way)          | Activity/icon display   |
| 2       | Lock button          | Press for one second to arm.  |
| 3       | Unlock button        | Press for one second to disarm.   |
| 4       | Auxiliary button     | Press and hold for 1.5 second to activate optional trunk release.         |
| 5       | Remote start button  | Press for one second to activate remote start.                            |
| 6       | Function button      | Allows access to programming and modifies operation of the other buttons. |
| 7       | Charge Port (2-way)  | Plug in the battery charger to this port.                                 |
| 8       | Label                | Back of remote has label to identify the remote as 2-way or 1-way.        |
| 9       | Battery Door (1-way) | For accessing batteries when necessary.                                   |
| 10      | Transmit LED (1-way) | Active when communicating   |

**Note:** If Keypad Lock is On, press **f** and then press **⏏** to exit.

## ➤ LC 1-way companion



See call out table for 2-way

## ➤ Transmitter configuration

| Level<br>Button | Direct Access  | <b>f</b> x 1                                    | <b>f</b> x 2                     | <b>f</b> x 3 | <b>f</b> x 4     |
|-----------------|----------------|---|----------------------------------|--------------|------------------|
|                 | Lock           | Silent Lock                                     |                                  |              |                  |
|                 | Unlock         | Silent Unlock                                   | Valet Mode                       | Car Finder   |                  |
|                 | Remote Start   | Reset<br>Runtime                                | Timer Mode                       | Smart Start  | Rear<br>Defogger |
|                 | Trunk Release  | AUX 1   | AUX 2                            | AUX 3        |                  |
|                 | Function Shift | Cabin<br>Temperature<br>request<br>(2-way only) | Runtime<br>Check<br>(2-way only) |              |                  |

# Using the system

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Please note the screen shot to the right of a feature indicates what the display looks like when this feature is activated.

## Lock

**Command:** Press one time to Lock

**Feedback:** Lock Icon appears, and parking lights flash once.

**Notes:** Press/hold for 1.5 seconds to Lock the system and activate the panic feature.

**Details:** The horn in the vehicle “honks” once. (if the option is installed), and the parking lights flash one time. If the power door locks have been connected, the doors lock.



When panic is activated the horn horns if connected an the parking lights flash for 30 sec. Panic mode can be disabled by pressing (icon) lock or unlock.




The system automatically checks for errors when it locks. The 2-way remote “beeps” once and the parking lights flash once to confirm locking. If no lock confirmation is received, the remote LC displays the out-of-range signal.

### If errors are found when locking:

If the door was open at the time of locking, you are notified of this active zone immediately after locking the system.

The horn in the vehicle “honks” again. The 2-way remote control sounds a short “error” tone, and the LCD displays the door icon.

### Locking without the honk (Silent Lock)


Press the  button on the remote once, and then press the  button. The system locks without the confirmation honk. The parking lights flash once. The 2-way remote displays the  icon. If no lock confirmation is received, the 2-way remote emits the Out Of Range signal.

## Unlock

**Command:** Press one time to Unlock




**Feedback:** Unlock icon appears.

**Notes:**

The vehicle horn, honks two-times and the parking lights flash two-times. The door locks (if connected) unlock, the 2-way remote beeps two-times and the LCD displays the  icon.



### Unlocking without the honk (Silent Lock)

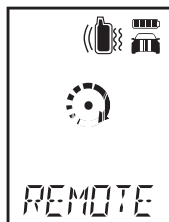
Press the  button on the remote once, and then press the  button. The system unlocks without the confirmation honk. The parking lights flash once. The 2-way remote displays the  icon. If no unlock confirmation is received, the 2-way remote emits the Out Of Range signal.

## Remote Start

**Command:** Press one time to activate Remote Start

**Feedback:** Remote Start icon appears on screen.  
The remote start tones play and parking lights flash.

**Notes:**



Before using the remote start be sure the vehicle is parked in a safe area with proper ventilation.

The preset remote start run time is 12 minutes. This can be changed to between 12 and 60 minutes.

The system has a feature, if programmed on, that automatically notifies you when the runtime is running low. When the system reaches 3-minutes and 1-minute of runtime remaining, it sends the 2-way remote control a paging signal.

### Points to remember:

If the hood is open or if the brake pedal is pressed, the vehicle will not remote start. **The remote start shuts down:**

- When the brake pedal is pressed.
- The hood is opened.
- When the remote start command is sent again from a remote control.
- When the runtime expires.


To drive your vehicle after it has been remote started:

1. Get in without stepping on the brake.
2. Insert the ignition key and turn it to the ON position.
3. Now, step on the brake.

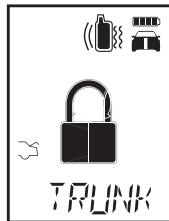
The remote control will play the remote start shutdown tone. **You have now taken direct control from the remote start system.**

### Valet Take-Over

The Valet Take-Over feature allows the vehicle to remain running after the key has been removed from the ignition. This feature is useful for occasions when you wish to exit and lock the vehicle for short periods of time, but would like to leave the motor running and the climate controls on.

To enable Valet take-over; while the vehicle is running, press  1 time and the parking lights will flash after a couple of seconds turn off the ignition and the car should stay running. Once you exit the vehicle you can lock the system and the car will remain running. If the vehicle shuts down, then the unit did not enter valet take-over mode.

- Command:** Press and hold for 1.5 seconds to activate the Trunk Release.
- Feedback:** The trunk icon appears and the remote plays a short tone.
- Notes:** This is an optional feature. See your sales rep/installer for details. The factory default screen displays the trunk icon and text. The text can be changed by your installer using the Bitwriter programming tool.



## **f** Function shift

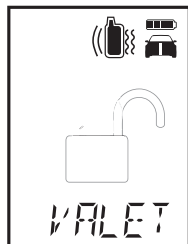
- Command:** Press 1 to 4 times. (See Transmitter configuration table)
- Feedback:** Display shows a text message across the bottom for the command received.
- Notes:** Each Press then release, shifts the function of the command button.

## Valet mode

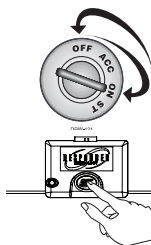
**Command:** Press *f* two-times and then .

**Feedback:** Unlock icon appears hollow, "Valet" displays in the text area when entering Valet mode.

**Notes:** If the system is already locked the remote beeps one time when entering Valet mode. When exiting Valet mode the unlock appears solid, Valet is displayed in the text area, and the remote beeps two times. The unlock icon is displayed but the doors stay locked.



To enter or exit Valet mode with the Valet/program switch:



Turn the ignition key on and then off.

At anytime during the next 10 seconds, press and release the Valet switch. Now the Status LED lights constantly if you have entered Valet® Mode, and goes out if you have exited Valet Mode.

**Note:** The LED on the control center turns on solid when in Valet Mode and shuts off when exiting Valet Mode.

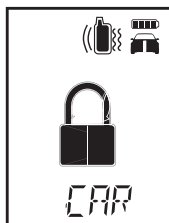
When locking the system in Valet Mode, the screen displays "valet" and the remote then emits an error tone. When unlocking in Valet Mode, the screen displays "valet" and the remote emits two error tones.

## Car finder

**Command:** Press **f** three-times and then .

**Feedback:** Remote beeps 1 short beep, the vehicle emits 1 long horn honk (if connected), and the parking lights flash 10 times.

**Notes:** Lock/Unlock cancels the light flashes.

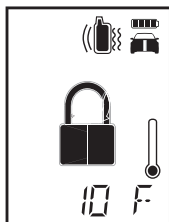


## Cabin temperature


**Command:** Press **f** one time, then Hold for 1.5 seconds.

**Feedback:** Screen will display current in cabin temperature.

**Notes:** Cabin temperature is displayed on the remote.



## Silent Lock

**Command:** Press **f** one-time and then press .

**Feedback:** Screen changes to the lock icon

**Notes:** Locks the system without honks


The system locks without the confirmation honk. The parking lights flash once. The 2-way remote blinks the LOCK icon to confirm locking. If no lock confirmation is received, the 2-way remote gives the Out Of Range signal.

- Fail-Safe Starter Kill

The starter is disabled by the system's Fail-Safe starter kill.

## Silent unlock



**Command:** Press **f** one-time and then press .

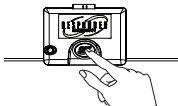
**Feedback:** Screen changes to unlock icon

**Notes:** Unlocks the system without chirps

## ► Overriding the optional starter kill

**To bypass the optional starter kill without a remote control:**

Use your override switch located on the control center (see diagram below) to bypass the system. This switch bypasses the system only if you have the vehicle key.



**To check proper operation:**

1. While the vehicle is locked, open the door. Immediately insert the key into the ignition and turn it to the run or on position (all the indicators in the dash turn on).
2. Press and release the Override Switch one time. The optional starter kill is bypassed. You can now start the vehicle with the key.

**Note:** The Override Switch feature allows you to select a specific number of presses needed to unlock the system. If the Override Switch has been programmed to a new number of presses by your authorized dealer, that number should be indicated below.

Override Switch Number \_\_\_\_\_

# Additional remote start features

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## Manual transmission

If the vehicle has manual transmission the proper steps must be followed before leaving the parked vehicle or the remote start feature is disabled.

1. Make sure the engine is running and the doors are closed.
2. Put the transmission in neutral.
3. Press on the vehicle's foot brake.
4. Apply the emergency brake.
5. Release the vehicle's foot brake. **Note:** Pressing the brake again after this step will disable the remote start feature.
6. Within 15 seconds activate the remote start from the remote.
7. The parking lights will flash 5 times confirming that the remote start is active. If the parking lights don't flash, then repeat steps 1 - 6.
8. Turn off the ignition (the car should stay running when key is turned off).
9. Exit the vehicle and close the door.
10. Lock the doors with the remote. (the vehicle shuts off when locking the system).

You can now remote start the vehicle. If a door is opened before the next remote start activation the system will not remote start.

**Note:** To enable Valet take-over with a manual transmission, open the door and enter into manual transmission mode, as described above. The parking lights flash one-time when entering Valet take-over. Once you exit the vehicle you can lock the system and the car will remain running. If the vehicle shuts down when locking, then the unit did not enter valet take-over mode.

## Timer mode

**Command:** Press **f** two-times and then .

**Feedback:** Small timer icon displays and "timer start on" displays in the text area. The parking lights flash 4 times fast to confirm.

**Notes:** Enables or disables the remote start timer mode.

The system must be locked for the timer mode to operate. The system will start every 3 hours for a maximum of six cycles until canceled by the brake, hood, or neutral safety shut-down wires. The remote will respond with the Start and Stop remote start notification during each Start and Stop of the Vehicle while in Timer mode.

### To activate timer mode with a manual transmission:

1. Enter the MTS mode.
2. Exit the vehicle, lock the doors with the remote.
3. Enter the timer mode. The parking lights quickly flash 4 times to confirm entry into timer mode (vehicle does not remote start at this point). Vehicle begins the timer mode sequence.

### To exit timer mode with transmitter:

- Press **f** twice and then press . Parking lights flash slowly four times confirming time mode is exited.

### To exit timer mode without transmitter:

1. Make sure the remote start system is not operating the engine.
2. Turn the ignition on. Timer Mode is exited and the parking lights flash slowly four times.

Timer Mode is exited automatically after the sixth run cycle. The parking lights slowly flash 4 times when exiting timer mode.


**Note:** The Bitwriter® can change the amount of times the remote start activates and, it can change the intervals between activations in timer mode.

## Turbo Timer mode

Turbo timer mode keeps the engine running after arriving at your destination for a programmable period of 1, 3, 5 or 10 minutes. This allows the system's timer to conveniently cool down the turbo after you have left the vehicle.


The system monitors the engine speed and will automatically shut the engine off if the RPMs rise above or fall below the programmed levels. This feature prevents damage to the motor due to fuel delivery system failures or other problems that may cause the engine to race

### To activate Turbo Timer Mode with an automatic transmission:

1. Make sure the Turbo timer feature is turned on in the features grid.
2. Open the vehicle door.
3. While the vehicle is running; press the **f** button twice followed by the  button.
4. The parking lights flash once and the remote plays the remote start activation tone confirming that the remote start is activated (the one way remote only flashes the parking lights).
5. Turn off the ignition (car stays running).
6. Exit the vehicle and lock the system.

At this point the vehicle stays running for the programmed runtime.

## To activate turbo timer mode with a manual transmission:


1. Enter MTS mode with the door open.
2. Transmit the timer mode feature with the remote by pressing **f** two-times, and then .
3. After exiting the vehicle, lock the system and the vehicle remains running for the programmed runtime. (The remote start feature is still enabled).

You can still remote start the vehicle after the turbo timer has timed out and shut off the vehicle. For safety reasons, if a door is opened (while the system is locked or unlocked ) while you are away, the remote start exits the manual transmission mode and does not remote start until the MTS sequence is re-initiated.



**Note:** An optional push button can be hard wired to the (-) activation input (H1/10) on the remote start. This allows the user to activate the turbo timer without having to use the remote.

When the vehicle is running follow the procedures listed above, but instead of pressing the remote, press the push button the appropriate number of times to activate the remote start (factory setting is for 1 pulse). The remote emits the remote start confirmation tone. Now you can turn off the ignition and exit the vehicle. The car remains running for the pre-programmed amount of time.



## Runtime check

- Command:** While the remote start is running, press  two-times, and then hold for 1.5 seconds.
- Feedback:** Text reads runtime and displays time left
- Notes:** This feature is only available on the 2way remote.



## Runtime reset

- Command:** While the remote start is running, press  onetime and then .
- Feedback:** Remote start ON tones.
- Notes:** Re-starts the remote start runtime counter if remote start is active. Note: If remote start is not active, the 2-WAY remote will respond with error tone.

## Rear defogger

- Command:** Press  four times, and then . (Only after remote start is on.)
- Feedback:** Defogger icon appears on remote and text reads Defrost On.
- Notes:** While the remote start is running the defroster will manually be turned on for one remote start cycle. When the remote start shuts down, the defroster will work normally. The defroster turns on when the temperature inside the vehicle is 55 degrees or below when this feature is wired and enabled.




## Smart start

- Command:** Press  three-times and then press .
- Feedback:** The parking lights flash 5 times fast and 'Smart Start On' displays in the text area.

**Notes:** Enables or disables the SmartStart feature. The smart start feature of this system will allow you to have the remote start activate when the vehicle reaches a certain temperature (hot or cold) or a certain voltage. The factory setting for temperature high is 100 °F the setting for low is 0 °F. The voltage setting is for 10.5V.

These settings can be adjusted or turned off by your installer when using the Bitwriter.

### To activate the Smart Start Mode with a manual transmission:

1. Enter the MTS procedure.
2. Exit the vehicle and press the  button on the remote (the vehicle will shut down when locking).
3. Press the  button on the remote 3 times and then press the  button.
4. The 2 way remote will beep once and Smart Start On is displayed in the text area.
5. The parking lights on the vehicle will flash 5 times fast confirming entry into smart start mode
6. The vehicle will now remote start when the cabin temperature reaches the programmed thresholds or when the vehicle battery reaches the programmed voltage.

The Smart Start Mode can be exited by following the activation procedure with the remote or can be deactivated manually by turning on the ignition or pressing the brake pedal in the vehicle. The parking lights will flash 5 times slow confirming that Smart Start Mode is exited.

**Details:** Smart start uses temperature and voltage settings to determine when the vehicle should start and run. If any changes to temperature or voltage are made using the Bitwriter programming tool Smart start activation is affected.

The Smart Start function works similar to the Timer mode. The system must be in the locked mode. Using the system default settings, it has a maximum of 6 starting cycles, and checks the voltage/cabin temperature every 3 hours to see if the thresholds have been met.

If thresholds have been met then the remote start will start the vehicle and run for

the pre programmed time. It counts the first start as one successful start, leaving 5 start cycles.

If the threshold has not been met then the system will not start the vehicle, and 6 start cycles are left. The unit continues to check threshold levels every 3 hours.



# Auxiliary features

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## Aux 1

**Command:** Press **f** one time and then press .

**Feedback:** Text displays the item activated.

**Notes:** This is an optional feature. See your sales rep/installer for details.


## Aux 2

**Command:** Press **f** two times and then press .

**Feedback:** Text display. the item activated\*

**Notes:** This is an optional feature. See your sales rep/installer for details.

## Aux 3

**Command:** Press **f** three times and then press .

**Feedback:** Text displays the item activated.

**Notes:** This is an optional feature. See your sales rep/installer for details.

\*Factory default is pulsed. The text can be changed by your installer using the Bitwriter® programming tool.

# Remote control feature programming


The Responder LC 2-way remote control has menus for configuring the remote control user features and for programming the remote to the system control module. Before you start make sure the keypad is unlocked. (See page 12)

## To program the remote user features:



Press and hold the **f** button on the remote for about 8 seconds. (ignore the car indicator at 3 seconds). The status screen clears and "Main Menu" is displayed in the text display area of the screen.



Release the **f** button to display the Remote Options menu.

| Options       | Description                                  |
|---------------|--|
| Remote Setup  | Allows feature programming of the remote     |
| Sensor Adjust | Not available with this system               |
| Pair Remote   | Sets up remote for programming to the system |
| Demo Mode     | Places remote in demo mode                   |
| Exit          | Exits programming                            |

Press the  button to scroll up, and press the  button to scroll down the main menu.

From the Main Menu, once a feature name is displayed in the text display area press and hold the **f** button until the remote beeps to confirm entry into the selected feature menu.

To access feature menu options, scroll up pressing the  button, or scroll down by pressing the  button.

When the feature that you want to program is displayed in the LCD text area, press and hold the **f** for 1 second to save the feature. The LCD screen returns to the previous options menu. You can save and exit the programming mode anytime by pressing the  or . Programming mode is automatically exited without saving if there is no remote activity for 30 seconds.

**Note:** Selecting "Back" returns to the previous menu without saving the setting.


## ► Remote setup options


| Feature              | Opt 1                   | Opt 2        | Opt 3      | Opt 4       | Opt 5 |
|----------------------|-------------------------|--------------|------------|-------------|-------|
| Auto keypad lock     | On                      | Off          | Back       |             |       |
| Page                 | On                      | Off          | Power save | Back        |       |
| Page alert           | Vibe                    | Tone         | Both       | Screen only | Back  |
| Remote start display | Clock                   | Temp         | Runtime    | Back        |       |
| Low runtime alert    | On                      | Off          | Back       |             |       |
| Car 2                | On                      | Off          | Home       | Back        |       |
| Back light color     | Off                     | 1-7          | Back       |             |       |
| Temp units           | F°                      | C°           | Back       |             |       |
| Button press beep    | On                      | Off          | back       |             |       |
| System type          | Remote start & Security | Remote start | Back       |             |       |
| Clock set            | Clock time              | Back         |            |             |       |

## ➤ Menu option descriptions

- Auto keypad lock

Automatically locks the remote buttons when the buttons are not used for 60 seconds. Prevents "accidental" presses of the remote.

Press **f** then  to unlock the keypad.

**Note:** If the auto keypad lock feature is programmed On, the remote unlocks when the vehicle ignition is turned Off. The remote stays unlocked to allow time to exit and unload the vehicle, and then lock the doors with the remote. When the  button is pressed, the keypad auto lock feature resumes normally.







- Page On or Off and Power save

When paging is "On" the remote checks the status of the system every four seconds, and reports any factory alarm triggers (if the system is within the operating range and the factory alarm option is installed).

In the paging "Off" setting, the remote does **not** check the status of the system. In the paging Off mode the remote beeps when a button on the remote is pressed.

In the "battery saver" mode, the remote goes into sleep mode if no buttons are pushed for 72 hours. The timer resets each time a button is pressed.

- Page Alert /Vibe/Beep Tone/Both or /Screen only  
Receive command confirmations on the remote with vibrations, beeps or both, or with display only.
- Remote start display: Clock, temperature and runtime  
Allows you to choose what is displayed in the text during the remote start sequence. **Clock** displays the current time during remote start. **Temperature** displays the current cabin temperature during the remote start. **Runtime** displays the runtime remaining during the remote start.

- **Low Runtime Alert**  
The remote reports with one short beep followed by 1 short error tone (repeated twice) and the text area displays "run time" when the remote start runtime is at the 3-minutes remaining. The remote beeps one more time when 1 minute is remaining. You have the option to let the remote start time out, or use the "runtime reset" feature . When programmed "Off" you will not receive a low runtime alert on the remote.
- **Car 2 On or Off/ Home**  
Turns Off or On, the 2 car operation from the remote. The "Home" option is not available.
- **Backlight Color Off/1 - 8**  
Turn Off the LCD backlighting or change the color of the backlighting. Color options include: Blue, green, red, aqua, purple, lime, clear
- **Temperature Units F and C**  
Display temperature in Fahrenheit or Celsius
- **Button Press Beep On or Off**  
Turn Off beeps when a button on the remote is pressed
- **System Type Remote Start & Security or Remote Start**  
Select the type of system you are using, security system with remote start or a keyless entry system with remote start (to ensure that the correct icons are displayed on the LCD)
- **Clock Set**  
To enter clock set mode, press the **f** button. The LC text display reads "hour" to confirm entry in the clock set menu.  
Press the  button to move up the menu, press the  button to move down the menu.  
After you select the time increment (hour/min), press **f**. The hour or minute flashes. Press the  button to move up to the hour or minute, and press the  button to move down to the hour or minute you want to set.  
Once the desired time has been reached you can either choose "back" in the menu or press  or  to save and exit.

## ➤ Pair remote mode

It is recommended that this feature for programming the remote to the system is performed by your installer.

## ➤ Demo modes

- Onetime with sound  
The LCD icons display one at a time with icon name displayed in the text field, while the remote is playing tones.
- Onetime without sound  
The LCD icons display one at a time until they are all turned on. The remote does **not** play any tones.

**Note:** If the charger is plugged into the remote and demo mode is activated, the remote plays the demo mode continuously. The continuous loop demo mode is exited when the charger is disconnected.

# Safety features

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This system has several important safety features to ensure proper operation of the motor and prevent accidental damage to the engine or its components.

## ➤ Optional starter anti-grind circuitry

Whenever the vehicle is remote started, advanced anti-grind circuitry prevents the starter from engaging, even if the key is turned to the start position. This prevents damage to the starter motor if the key is turned to the start position during remote start operation.

**Note:** Anti-grind circuitry only works when the remote start system is operating the motor and the optional Failsafe® Starter Kill relay is installed.

## ➤ Disabling the remote start system

This feature allows the remote start unit to be temporarily disabled to prevent the vehicle from being remote started accidentally. This feature is useful when the vehicle is being serviced or stored in an enclosed area.

To disable the remote start, move the shutdown toggle switch to the Off position. Check with your installer for the location of the shutdown switch.

Location of Shutdown Switch\_\_\_\_\_

# Diagnostics

---

The microprocessor at the heart of the system is constantly monitoring the switches that are connected to the main unit.

## ► Locking

If the system is locked at the same time that the door is active, you will hear one horn honk to indicate locking and a second horn honk to indicate Bypass Notification.

For example, if your vehicle has an interior light exit delay and you lock the system before the interior light turns Off, you may hear a second Bypass Notification honk.

**Note:** Bypass Notification does not occur when the system is in Silent Mode or if the notification honks have been programmed Off by the installer.

## ► Unlocking

Extra honks when unlocking the system is a notification that the batteries in the remote are low and need to be replaced.

|  |
|--|
| <p><b>Important:</b> The optional horn honk feature must be installed.</p> |
|--|



## ► Remote start

This system can provide you with information to indicate what the problem is when using the remote start. When the remote start is activated and fails to engage, count the parking light flashes to determine the problem. The parking lights will flash between 5 - 8 times to indicate what caused the no start situation.

- 5 flashes: brake wire is active
- 6 flashes: hood pin is active
- 7 flashes: manual transmission mode is enabled and not initialized
- 8 flashes: neutral safety wire has no ground or the remote start defeat toggle switch is off.

Keep a record of the number of flashes, to assist your installer when taking the vehicle in for service.

# Owner recognition

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Owner recognition lets up to four users of the system have unique settings that meet their specific needs. It is almost like having four separate systems in your vehicle, one for each user. This feature is only available to authorized dealers using the Bitwriter or Bitwriter 2 program tool.

## Rapid resume logic

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This Directed system will store its current state to non-volatile memory. If power is lost and then reconnected the system will recall the stored state from memory.

For example, if the unit is in Valet Mode and the battery is disconnected for any reason, such as servicing the car, when the battery is reconnected the unit will still be in Valet Mode. This applies to all states of the system including lock or unlock.

## Power saver mode

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### ► System

Your system automatically enters Power Saver Mode while locked or in Valet Mode, after a period of time in which no operation has been performed. This lowers the current draw on the vehicle's battery. Power Saver Mode takes over under the following conditions:

**Power Saver when the system is locked:** After the system has been Locked for 24 hours the LED will flash at half its normal rate, decreasing the system's current draw.

**Power Saver in Valet Mode:** When the system enters Valet Mode the Status LED on the Responder LC control center illuminates steadily. If the vehicle is not used (ignition is not turned on) for a one-hour period while the system is in Valet Mode, the status LED will shut Off. If the system remains in Valet Mode, the LED will come back on the next time the ignition is turned on and then back Off.

## ➤ 2-way remote

Your Responder LC 2way remote control has a feature called remote power save mode. When programmed On under remote options, the remote conserves power by disabling the paging function if unused for more than 72 hours. Pressing any button on the remote restores the paging function.

The default setting is On. See Remote control programming section of this guide or ask your dealer for details on how to program.

## Programming options

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Your system has many custom programmable options. Some may require installation labor. Ask your authorized dealer for details.

The following is a list of the programmable options, with the factory settings in **Bold**.

- **Active** locking (remote only) passive locking will lock the doors 30 seconds after the ignition is turned Off and the last door has been closed; or Auto Re-lock automatically locks 60 seconds after unlocking (if no door is opened).
- Locking/Unlocking with horn honks **On** or Off.
- Ignition controlled door lock feature On or **Off**: When this feature is programmed on, the doors will lock three seconds after the ignition is turned on, and unlock when the ignition is turned Off.

If your installer is programming the system, ignition lock and unlock are independent features that can be programmed separately.

- **Panic mode enabled**/disabled when the ignition is turned on or completely turned Off. (Some states have laws against horns continually honking in moving cars.)

- **Comfort closure** is a programming option which closes the vehicle's windows after remote locking.

**Note:** Comfort closure can only be used on cars that have the capability of closing the windows (and on some cars the sunroof as well) with the key cylinder in the door.

## Convenience expansions

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Listed below are some of the expansion options available. Please consult your dealer for a complete explanation of all the options available to you.

### **Factory Alarm Trigger Notification:**

This system has an input that can be connected to the horn circuit in the vehicle. If the vehicle has a factory alarm and is controlled by this system (for lock/unlock), the remote reports when the factory alarm has been triggered. When the factory alarm is triggered the remote screen displays the alarm icon and "alarm door open" is displayed in the text area.

**Note:** The remote must be in range and the system locked to receive the report. The system does not report that the factory alarm has been triggered when unlocking with the remote.

**Power Trunk Release:** The accessory output of the system can operate a factory power release for the vehicle's trunk or hatch. Sometimes an optional relay is required. If the factory release is not power-activated, Directed®'s 522T trunk release solenoid can often be added.

**Power Window Control:** Automatic power window control is provided with the 529T and 530T systems. These can operate power windows, and can roll them up automatically when the system is Locked, roll them down, or both up and down.

# Glossary of terms

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**2-Way Remote:** A hand-held, remote control which operates the various functions of your system and receives feedback and pages from the system.

**Control Center:** The control center contains the system's radio-frequency antenna, the valet and override switch, and the Status LED. For maximum remote-control range, the Control Center is usually located at the top of the windshield, centered near the rear-view mirror.

**Control Module:** The "brain" of your system. Usually hidden underneath the dash area of the vehicle. It houses the microprocessor which monitors your vehicle and controls all of the system's functions.

**Failsafe® Starter Kill** (if equipped): An automatic switch controlled by the system which prevents the vehicle's starter from cranking whenever the system is locked. The vehicle is never prevented from cranking when the system is unlocked in Valet® Mode, or should the starter kill switch fail. Your system is ready for this feature, however installation of this feature may require additional labor.

**Input:** Any physical connection to the system. An input can be provided by existing systems in the vehicle, such as ignition or courtesy lights.

**In-vehicle status LED:** A light used to indicate the status of your system. It is located on your systems control center.

**Valet Button:** A small push button switch located on your systems control center. It is used to override the starter interrupt when a 2-way remote is lost or damaged, or to enter or exit Valet Mode.



Cut along the dotted line and fold to keep in purse or wallet for a quick and easy reference.



|    |  |                        |    |     |                        |
|----|--|------------------------|----|-----|------------------------|
| 17 |  | Vibe On                | 27 |     | Car Door               |
| 18 |  | Pager Tone On          | 28 |     | Home (Garage - Open)** |
| 19 |  | Siren*                 | 29 |     | Home (Garage Close)**  |
| 20 |  | Silent Mode 2*         | 30 |     | Car 1                  |
| 21 |  | Transmit               | 31 |     | Car 2                  |
| 22 |  | Receive                | 32 | ALL | All Zones*             |
| 23 |  | Out of Range           | 33 |     | Defroster              |
| 24 |  | Sensor*                | 34 |     | Sound Wave             |
| 25 |  | Sensor Bypassed*       | 35 |     | Large Siren*           |
| 26 |  | Car Door (Zone bypass) |    |     |                        |


\*Feature only available on full security and remote start systems. Does not apply to 4702 model.

\*\* Feature not available




# Quick reference guide

## ► Locking

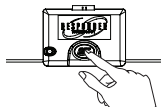
To lock, press the  button. The remote beeps one-time and the LCD displays "locked"

## ► Unlocking

To unlock press the  button. The remote beeps two-times and the LCD displays "unlock".

## ► Bypassing the optional starter kill without a remote

Turn on the ignition. Press and release the Valet button within 15 seconds. The vehicle should now start. If it does not, you may have waited too long or pressed the button incorrect number of times.



Number of Valet button presses for disabling \_\_\_\_\_


## ► Silent Lock

Press **f** one-time and then press . The lock icon turns on and the LCD displays "silent lock".

## ► Silent UnLock

Press **f** one-time and then press . The unlock icon turns on and the LCD displays "silent unlock".

## ► Remote Start

Press . The remote will play the remote start tones and the LCD text will display "remote start on" when activating. When deactivating the remote start, the remote will play the remote start Off tones and the LCD text will display "remote start Off".



► Rear Defogger


Press **f** four-times, and then press  (only after remote start is On.) The remote beeps one-time.

► To disable the remote start system


Move the shutdown toggle switch to the Off position.

Location of Shutdown Toggle Switch\_\_\_\_\_

► Valet Mode

Press **f** two-times and then  The remote will beep once and the LCD displays "valet" when enabled. When disabling the remote will beep twice and the LCD displays "valet".

► Valet take-over

1. Before turning Off the engine, press and release the  button. Then wait a few seconds.
2. Turn the ignition key to the Off position.
3. Exit the vehicle and lock the doors with the remote.  
The engine will remain running until the programmed time elapses or a shut-down input is received.

# Limited lifetime consumer warranty

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Directed Electronics. ("Directed") promises to the original purchaser to repair or replace (at Directed's election) with a comparable reconditioned model any Directed unit (hereafter the "unit"), excluding without limitation the siren, the remote transmitters, the associated sensors and accessories, which proves to be defective in workmanship or material under reasonable use during the lifetime of the vehicle provided the following conditions are met: the unit was purchased from an authorized Directed dealer, the unit was professionally installed and serviced by an authorized Directed dealer; the unit will be professionally reinstalled in the vehicle in which it was originally installed by an authorized Directed dealer; and the unit is returned to Directed, shipping prepaid with a legible copy of the bill of sale or other dated proof of purchase bearing the following information: consumer's name, telephone number and address; the authorized dealers name, telephone number and address; complete product description, including accessories; the year, make and model of the vehicle; vehicle license number and vehicle identification number. All components other than the unit, including without limitation the siren, the remote transmitters and the associated sensors and accessories, carry a one-year warranty from the date of purchase of the same. ALL PRODUCTS RECEIVED BY DIRECTED FOR WARRANTY REPAIR WITHOUT PROOF OF PURCHASE WILL BE DENIED. This warranty is non-transferable and is automatically void if: the original purchaser has not completed the warranty card and mailed it within ten (10) days from the date of purchase to the address listed on the card; the unit's date code or serial number is defaced, missing or altered; the unit has been modified or used in a manner contrary to its intended purpose; the unit has been damaged by accident, unreasonable use, neglect, improper service, installation or other causes not arising out of defects in materials or construction. The warranty does not cover damage to the unit caused by installation or removal of the unit. Directed, in its sole discretion, will determine what constitutes excessive damage and may refuse the return of any unit with excessive damage.

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Some states do not allow limitations on how long an implied warranty will last or the exclusion or limitation of incidental or consequential damages. This warranty gives you specific legal rights and you may also have other rights that vary from State to State.

This warranty is only valid for sale of product(s) within the United States of America. Product(s) sold outside of the United States of America are sold "AS-IS" and shall have NO WARRANTY, express or implied. This product may be covered by a Guaranteed Protection Plan ("GPP"). See your authorized Directed dealer for details of the plan or call Directed Customer Service at 1-800-876-0800.

Make sure you have all of the following information from your authorized Directed dealer:

A clear copy of the sales receipt, showing the following:

- o Date of purchase
- o Your full name and address
- o Authorized dealer's company name and address
- o Type of alarm installed
- o Year, make, model and color of the automobile
- o Automobile license number
- o Vehicle identification number
- o All security options installed on automobile
- o Installation receipts

## The company behind this system is Directed Electronics

Since its inception, Directed Electronics has had one purpose, to provide consumers with the finest vehicle security and car stereo products and accessories available. The recipient of nearly 100 patents and Innovations Awards in the field of advanced electronic technology.

Directed is ISO 9001 registered.

Quality Directed Electronics products are sold and serviced throughout North America and around the world.

Call (800) 274-0200 for more information about our products and services.

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